

Supplemental Material to:

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Lithocholic acid extends longevity of chronologically aging yeast only if added at certain critical periods of their lifespan

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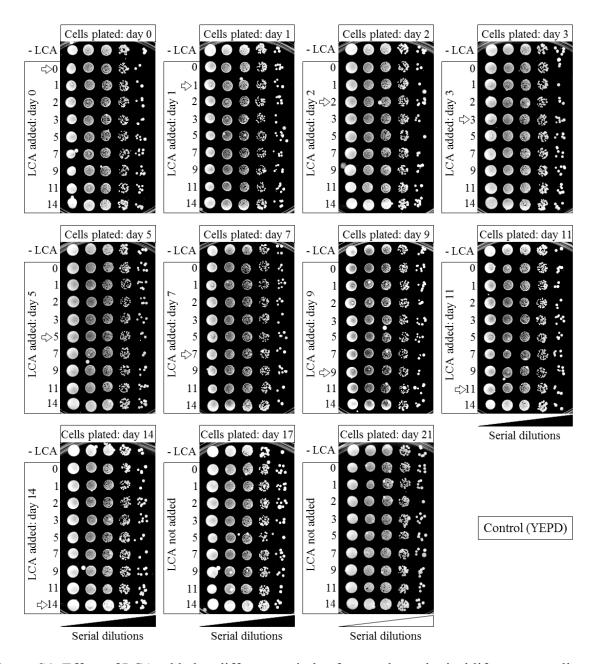


Figure S1. Effect of LCA added at different periods of yeast chronological lifespan on cell growth under non-stressful conditions. Wild-type yeast cells were cultured in YP medium initially containing 0.2% glucose, and LCA was added at the final concentration of 50 μ M to a cell culture immediately following cell inoculation into the medium (on day 0) or on day 1, 2, 3, 5, 7, 9, 11 or 14 of cell culturing in this medium. Spot assays were performed as described in "Materials and Methods". Serial ten-fold dilutions of cells were spotted on plates with solid YP

medium containing 2% glucose as carbon source. All pictures were taken after a 3-day incubation at 30° C.

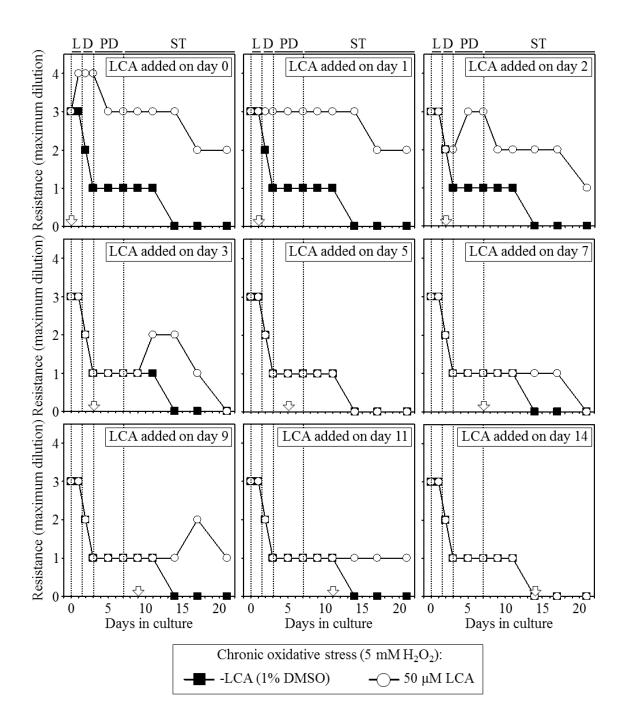


Figure S2. LCA differentially influences a longevity-extending process of the development of resistance to chronic oxidative stress if added at different periods of yeast chronological lifespan.

A graphic presentation of the results of spot assays for monitoring oxidative stress resistance, which is shown in Fig. 10.

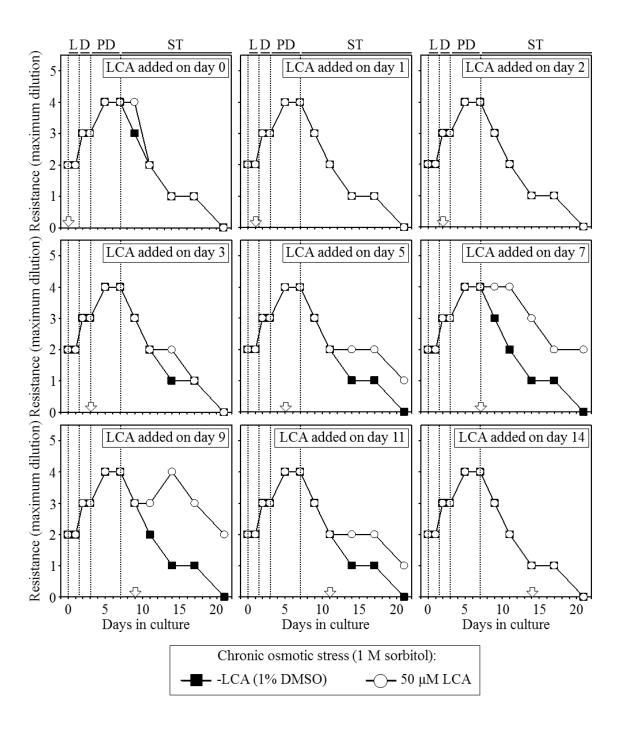


Figure S3. LCA differentially influences a longevity-extending process of the development of resistance to chronic thermal stress if added at different periods of yeast chronological lifespan.

A graphic presentation of the results of spot assays for monitoring thermal stress resistance, which is shown in Fig. 11.

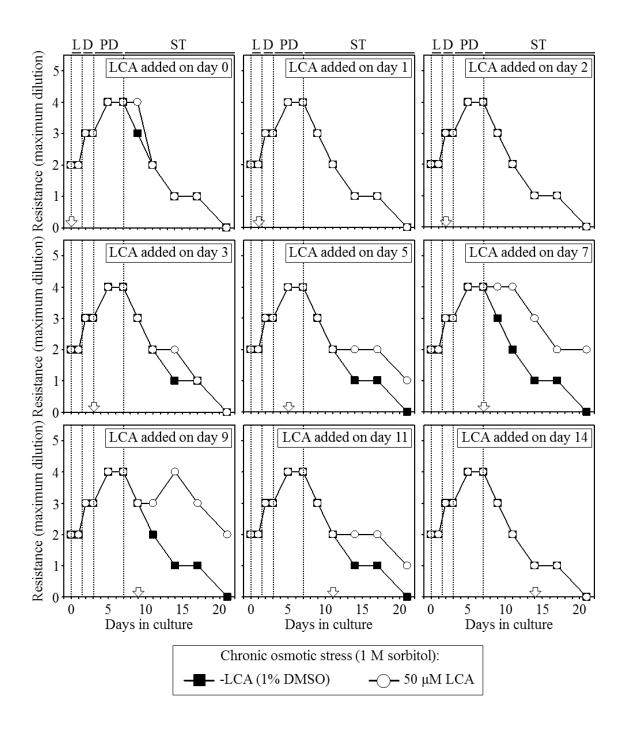


Figure S4. LCA differentially influences a longevity-extending process of the development of resistance to chronic osmotic stress if added at different periods of yeast chronological lifespan.

A graphic presentation of the results of spot assays for monitoring osmotic stress resistance, which is shown in Fig. 12.